

1614



ENTERED

## RAW SEQUENCE LISTING

DATE: 09/12/2002

PATENT APPLICATION: US/09/856,796B

TIME: 10:01:56

Input Set : A:\Us98cnrn.app

Output Set: N:\CRF4\09122002\I856796B.raw

3 <110> APPLICANT: HIRSCH, FRANCOIS  
 4 HAEFFNER, ASTRID  
 6 <120> TITLE OF INVENTION: NF-KB ACTIVATION INHIBITORS, AND THEIR PHARMACEUTICAL  
 7 USES  
 9 <130> FILE REFERENCE: USB98CNRN  
 11 <140> CURRENT APPLICATION NUMBER: 09/856,796B  
 C--> 12 <141> CURRENT FILING DATE: 2001-09-07  
 14 <150> PRIOR APPLICATION NUMBER: PCT/FR99/02897  
 15 <151> PRIOR FILING DATE: 1999-11-24  
 17 <150> PRIOR APPLICATION NUMBER: FR 98/14858  
 18 <151> PRIOR FILING DATE: 1998-11-25  
 20 <160> NUMBER OF SEQ ID NOS: 4  
 22 <170> SOFTWARE: PatentIn Ver. 2.1  
 24 <210> SEQ ID NO: 1  
 25 <211> LENGTH: 609  
 26 <212> TYPE: DNA  
 27 <213> ORGANISM: Homo sapiens  
 29 <220> FEATURE:  
 30 <221> NAME/KEY: CDS  
 31 <222> LOCATION: (1)..(606)  
 33 <400> SEQUENCE: 1  
 34 atg gct aca ggc tcc cgg acg tcc ctg ctc ctg gct ttt ggc ctg ctc 48  
 35 Met Ala Thr Gly Ser Arg Thr Ser Leu Leu Leu Ala Phe Gly Leu Leu  
 36 1 5 10 15  
 38 tgc ctg ccc tgg ctt caa gag ggc agt gcc ttc cca acc att ccc tta 96  
 39 Cys Leu Pro Trp Leu Gln Glu Gly Ser Ala Phe Pro Thr Ile Pro Leu  
 40 20 25 30  
 42 tcc agg ctt ttt gac aac gct agt ctc cgc gcc cat cgt ctg cac cag 144  
 43 Ser Arg Leu Phe Asp Asn Ala Ser Leu Arg Ala His Arg Leu His Gln  
 44 35 40 45  
 46 ctg gcc ttt gac acc tac cag gag ttt aac ccc cag acc tcc ctc tgt 192  
 47 Leu Ala Phe Asp Thr Tyr Gln Glu Phe Asn Pro Gln Thr Ser Leu Cys  
 48 50 55 60  
 50 ttc tca gag tct att ccg aca ccc tcc aac agg gag gaa aca caa cag 240  
 51 Phe Ser Glu Ser Ile Pro Thr Pro Ser Asn Arg Glu Glu Thr Gln Gln  
 52 65 70 75 80  
 54 aaa tcc aac cta gag ctg ctc cgc atc tcc ctg ctg ctc atc cag tcg 288  
 55 Lys Ser Asn Leu Glu Leu Leu Arg Ile Ser Leu Leu Leu Ile Gln Ser  
 56 85 90 95  
 58 tgg ctg gag ccc gtg cag ttc ctc agg agt gtc ttc gcc aac agc ctg 336  
 59 Trp Leu Glu Pro Val Gln Phe Leu Arg Ser Val Phe Ala Asn Ser Leu  
 60 100 105 110  
 62 gtg tac ggc gcc tct gac agc aac gtc tat gac ctc cta aag gac cta 384

## RAW SEQUENCE LISTING

PATENT APPLICATION: US/09/856,796B

DATE: 09/12/2002

TIME: 10:01:58

Input Set : A:\Us98cnrn.app

Output Set: N:\CRF4\09122002\I856796B.raw

RECEIVED  
SEP 18 2002  
TECH CENTER 1600/2900

```

63 Val Tyr Gly Ala Ser Asp Ser Asn Val Tyr Asp Leu Leu Lys Asp Leu
64      115      120      125
66 gag gaa ggc atc caa acg ctg atg ggg agg ctg gaa gat ggc agc ccc 432
67 Glu Glu Gly Ile Gln Thr Leu Met Gly Arg Leu Glu Asp Gly Ser Pro
68      130      135      140
70 cgg act ggg cag atc ttc aag cag acc tac agc aag ttc gac aca aac 480
71 Arg Thr Gly Gln Ile Phe Lys Gln Thr Tyr Ser Lys Phe Asp Thr Asn
72 145      150      155      160
74 tca cac aac gat gac gca cta ctc aag aac tac ggg ctg ctc tac tgc 528
75 Ser His Asn Asp Asp Ala Leu Leu Lys Asn Tyr Gly Leu Leu Tyr Cys
76      165      170      175
78 ttc agg aag gac atg gac aag gtc gag aca ttc ctg cgc atc gtg cag 576
79 Phe Arg Lys Asp Met Asp Lys Val Glu Thr Phe Leu Arg Ile Val Gln
80      180      185      190
82 tgc cgc tct gtg gag ggc agc tgt ggc ttc tag 609
83 Cys Arg Ser Val Glu Gly Ser Cys Gly Phe
84      195      200
87 <210> SEQ ID NO: 2
88 <211> LENGTH: 202
89 <212> TYPE: PRT
90 <213> ORGANISM: Homo sapiens
92 <400> SEQUENCE: 2
93 Met Ala Thr Gly Ser Arg Thr Ser Leu Leu Ala Phe Gly Leu Leu
94 1      5      10      15
96 Cys Leu Pro Trp Leu Gln Glu Gly Ser Ala Phe Pro Thr Ile Pro Leu
97      20      25      30
99 Ser Arg Leu Phe Asp Asn Ala Ser Leu Arg Ala His Arg Leu His Gln
100      35      40      45
102 Leu Ala Phe Asp Thr Tyr Gln Glu Phe Asn Pro Gln Thr Ser Leu Cys
103      50      55      60
105 Phe Ser Glu Ser Ile Pro Thr Pro Ser Asn Arg Glu Glu Thr Gln Gln
106 65      70      75      80
108 Lys Ser Asn Leu Glu Leu Leu Arg Ile Ser Leu Leu Leu Ile Gln Ser
109      85      90      95
111 Trp Leu Glu Pro Val Gln Phe Leu Arg Ser Val Phe Ala Asn Ser Leu
112      100      105      110
114 Val Tyr Gly Ala Ser Asp Ser Asn Val Tyr Asp Leu Leu Lys Asp Leu
115      115      120      125
117 Glu Glu Gly Ile Gln Thr Leu Met Gly Arg Leu Glu Asp Gly Ser Pro
118      130      135      140
120 Arg Thr Gly Gln Ile Phe Lys Gln Thr Tyr Ser Lys Phe Asp Thr Asn
121 145      150      155      160
123 Ser His Asn Asp Asp Ala Leu Leu Lys Asn Tyr Gly Leu Leu Tyr Cys
124      165      170      175
126 Phe Arg Lys Asp Met Asp Lys Val Glu Thr Phe Leu Arg Ile Val Gln
127      180      185      190
129 Cys Arg Ser Val Glu Gly Ser Cys Gly Phe
130      195      200
133 <210> SEQ ID NO: 3

```

## RAW SEQUENCE LISTING

DATE: 09/12/2002

PATENT APPLICATION: US/09/856,796B

TIME: 10:01:56

Input Set : A:\Us98cnrn.app

Output Set: N:\CRF4\09122002\I856796B.raw

134 &lt;211&gt; LENGTH: 582

135 &lt;212&gt; TYPE: DNA

136 &lt;213&gt; ORGANISM: Homo sapiens

138 &lt;220&gt; FEATURE:

139 &lt;221&gt; NAME/KEY: CDS

140 &lt;222&gt; LOCATION: (1)..(579)

142 &lt;400&gt; SEQUENCE: 3

```

143 atg ggg gtg cac gaa tgt cct gcc tgg ctg tgg ctt ctc ctg tcc ctg 48
144 Met Gly Val His Glu Cys Pro Ala Trp Leu Trp Leu Leu Leu Ser Leu
145 1 5 10 15
147 ctg tcg ctc cct ctg ggc ctc cca gtc ctg ggc gcc cca cca cgc ctc 96
148 Leu Ser Leu Pro Leu Gly Leu Pro Val Leu Gly Ala Pro Pro Arg Leu
149 20 25 30
151 atc tgt gac agc cga gtc ctg gag agg tac ctc ttg gag gcc aag gag 144
152 Ile Cys Asp Ser Arg Val Leu Glu Arg Tyr Leu Leu Glu Ala Lys Glu
153 35 40 45
155 gcc gag aat atc acg acg ggc tgt gct gaa cac tgc agc ttg aat gag 192
156 Ala Glu Asn Ile Thr Thr Gly Cys Ala Glu His Cys Ser Leu Asn Glu
157 50 55 60
159 aat atc act gtc cca gac acc aaa gtt aat ttc tat gcc tgg aag agg 240
160 Asn Ile Thr Val Pro Asp Thr Lys Val Asn Phe Tyr Ala Trp Lys Arg
161 65 70 75 80
163 atg gag gtc ggg cag cag gcc gta gaa gtc tgg cag ggc ctg gcc ctg 288
164 Met Glu Val Gly Gln Gln Ala Val Glu Val Trp Gln Gly Leu Ala Leu
165 85 90 95
167 ctg tcg gaa gct gtc ctg cgg ggc cag gcc ctg ttg gtc aac tct tcc 336
168 Leu Ser Glu Ala Val Leu Arg Gly Gln Ala Leu Leu Val Asn Ser Ser
169 100 105 110
171 cag ccg tgg gag ccc ctg cag ctg cat gtg gat aaa gcc gtc agt ggc 384
172 Gln Pro Trp Glu Pro Leu Gln Leu His Val Asp Lys Ala Val Ser Gly
173 115 120 125
175 ctt cgc agc ctc acc act ctg ctt cgg gct ctg gga gcc cag aag gaa 432
176 Leu Arg Ser Leu Thr Thr Leu Leu Arg Ala Leu Gly Ala Gln Lys Glu
177 130 135 140
179 gcc atc tcc cct cca gat gcg gcc tca gct gct cca ctc cga aca atc 480
180 Ala Ile Ser Pro Pro Asp Ala Ala Ser Ala Ala Pro Leu Arg Thr Ile
181 145 150 155 160
183 act gct gac act ttc cgc aaa ctc ttc cga gtc tac tcc aat ttc ctc 528
184 Thr Ala Asp Thr Phe Arg Lys Leu Phe Arg Val Tyr Ser Asn Phe Leu
185 165 170 175
187 cgg gga aag ctg aag ctg tac aca ggg gag gcc tgc agg aca ggg gac 576
188 Arg Gly Lys Leu Lys Leu Tyr Thr Gly Glu Ala Cys Arg Thr Gly Asp
189 180 185 190
191 aga tga 582
192 Arg

```

195 &lt;210&gt; SEQ ID NO: 4

196 &lt;211&gt; LENGTH: 193

197 &lt;212&gt; TYPE: PRT

198 &lt;213&gt; ORGANISM: Homo sapiens

## RAW SEQUENCE LISTING

DATE: 09/12/2002

PATENT APPLICATION: US/09/856,796B

TIME: 10:01:56

Input Set : A:\Us98cnrn.app

Output Set: N:\CRF4\09122002\I856796B.raw

200 &lt;400&gt; SEQUENCE: 4

```

201 Met Gly Val His Glu Cys Pro Ala Trp Leu Trp Leu Leu Ser Leu
202   1           5           10           15
204 Leu Ser Leu Pro Leu Gly Leu Pro Val Leu Gly Ala Pro Pro Arg Leu
205           20           25           30
207 Ile Cys Asp Ser Arg Val Leu Glu Arg Tyr Leu Leu Glu Ala Lys Glu
208           35           40           45
210 Ala Glu Asn Ile Thr Thr Gly Cys Ala Glu His Cys Ser Leu Asn Glu
211           50           55           60
213 Asn Ile Thr Val Pro Asp Thr Lys Val Asn Phe Tyr Ala Trp Lys Arg
214  65           70           75           80
216 Met Glu Val Gly Gln Gln Ala Val Glu Val Trp Gln Gly Leu Ala Leu
217           85           90           95
219 Leu Ser Glu Ala Val Leu Arg Gly Gln Ala Leu Leu Val Asn Ser Ser
220           100          105          110
222 Gln Pro Trp Glu Pro Leu Gln Leu His Val Asp Lys Ala Val Ser Gly
223           115          120          125
225 Leu Arg Ser Leu Thr Thr Leu Leu Arg Ala Leu Gly Ala Gln Lys Glu
226           130          135          140
228 Ala Ile Ser Pro Pro Asp Ala Ala Ser Ala Ala Pro Leu Arg Thr Ile
229 145           150          155          160
231 Thr Ala Asp Thr Phe Arg Lys Leu Phe Arg Val Tyr Ser Asn Phe Leu
232           165          170          175
234 Arg Gly Lys Leu Lys Leu Tyr Thr Gly Glu Ala Cys Arg Thr Gly Asp
235           180          185          190
237 Arg

```

VERIFICATION SUMMARY

DATE: 09/12/2002

PATENT APPLICATION: US/09/856,796B

TIME: 10:01:57

Input Set : A:\Us98cnrn.app

Output Set: N:\CRF4\09122002\I856796B.raw

L:12 M:271 C: Current Filing Date differs, Replaced Current Filing Date